

# MIAMI-DADE COUNTY PRODUCT CONTROL SECTION

11805 SW 26 Street, Room 208 Miami, Florida 33175-2474 T (786) 315-2590 F (786) 315-2599

# www.miamidade.gov/economy

# **NOTICE OF ACCEPTANCE (NOA)**

Trane US, Inc. 1515 Mercer Road Lexington, KY 40511

# Scope:

This NOA is being issued under the applicable rules and regulations governing the use of construction materials. The documentation submitted has been reviewed and accepted by Miami-Dade County RER- Product Control Section to be used in Miami Dade County and other areas where allowed by the Authority Having Jurisdiction (AHJ).

This NOA shall not be valid after the expiration date stated below. The Miami-Dade County Product Control Division (In Miami Dade County) and/or the AHJ (in areas other than Miami Dade County) reserve the right to have this product or material tested for quality assurance purposes. If this product or material fails to perform in the accepted manner, the manufacturer will incur the expense of such testing and the AHJ may immediately revoke, modify, or suspend the use of such product or material within their jurisdiction. RER reserves the right to revoke this acceptance, if it is determined by Miami-Dade County Product Control Section that this product or material fails to meet the requirements of the applicable building code.

This product is approved as described herein, and has been designed to comply with the High Velocity Hurricane Zone of the Florida Building Code.

# **DESCRIPTION:** Trane Custom Climate Changer Air Handler Units

**APPROVAL DOCUMENT:** Drawing No. S6538-0029, titled "Trane Custom Climate Changer Air Handler Units", sheets 1 through 13 of 13, prepared by Wolters Engineering, Inc., dated October 30, 2014, signed & sealed by Scott Wolters, P.E., on October 30, 2014, bearing Miami-Dade County Product Control Revision stamp with the Notice of Acceptance number and the expiration date by the Miami-Dade County Product Control Section.

# MISSILE IMPACT RATING: Large and Small Missile Impact Resistant

**LABELING:** Each panel shall bear a permanent label with the manufacturer's name or logo, city, state and the following statement: "Miami-Dade County Product Control Approved", unless otherwise noted herein.

**RENEWAL** of this NOA shall be considered after a renewal application has been filed and there has been no change in the applicable building code negatively affecting the performance of this product.

**TERMINATION** of this NOA will occur after the expiration date or if there has been a revision or change in the materials, use, and/or manufacture of the product or process. Misuse of this NOA as an endorsement of any product, for sales, advertising or any other purposes shall automatically terminate this NOA. Failure to comply with any section of this NOA shall be cause for termination and removal of NOA.

**ADVERTISEMENT:** The NOA number preceded by the words Miami-Dade County, Florida, and followed by the expiration date may be displayed in advertising literature. If any portion of the NOA is displayed, then it shall be done in its entirety.

**INSPECTION:** A copy of this entire NOA shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at the request of the Building Official.

This NOA revises NOA # 13-0708.07 and consists of this page 1, evidence submitted pages E-1 & E-2 as well as approval document mentioned above.

The submitted documentation was reviewed by Helmy A. Makar, P.E., M.S.

MIAMI-DADE COUNTY
APPROVED

He G. A. M. lov 07/30/2015

NOA No. 14-1120.11 Expiration Date: 08/28/2018 Approval Date: 07/30/2015

Page 1

# Trane US, Inc.

# NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

# 1. EVIDENCE SUBMITTED UNDER PREVIOUS APPROVAL # 08-0530.02

#### A. DRAWINGS

1. Drawing No. S6538-0029, titled "Trane Custom Climate Changer Air Handler Units", sheets 1 through 13 of 13, prepared by Wolters Engineering, Inc., dated July 29, 2008, signed and sealed by Scott Wolters, P.E., on July 29, 2008.

### B. TESTS

1. Test report on Large Missile Impact Test, Cyclic Wind Pressure Test and Uniform Static Air Pressure Test of Trane Custom Climate Changer Air Handler Unit, prepared by Hurricane Test Laboratory, Inc., Report No. 0254-0519-07, dated 02/18/2008, signed and sealed by Vinu J. Abraham, P.E.

# C. CALCULATIONS

1. Panel and fasteners analysis prepared by Wolters Engineering, Inc., dated May 12, 2008, signed and sealed by Scott Wolters, P.E.

# D. QUALITY ASSURANCE

1. By Miami-Dade County Building Code Compliance Office.

# E. MATERIAL CERTIFICATIONS

- 1. Tensile Test Report No. 11M-1295, prepared by QC Metallurgical, Inc., dated October 30, 2001.
- 2. Tape properties by SikaLastomer Technique.
- 3. Tape properties by Durace, Inc.
- 4. Rigid Froth-Foam properties from Foam Enterprises.
- 5. Salt Spray test per ASTM B117.
- 6. Industrial Polyurethane Adhesive/Sealant properties by Sikaflex.

# 2. EVIDENCE SUBMITTED UNDER PREVIOUS APPROVAL # 13-0708.07

### A. DRAWINGS

1. Drawing No. S6538-0029, titled "Trane Custom Climate Changer Air Handler Units", sheets 1 through 13 of 13, prepared by Wolters Engineering, Inc., dated May 29, 2013, signed and sealed by Scott Wolters, P.E., on May 29, 2013.

### B. TESTS:

1. None.

### C. CALCULATIONS:

1. None.

Helmy A. Makar, P.E., M.S. Product Control Unit Supervisor NOA No. 14-1120.11 Expiration Date: 08/28/2018 Approval Date: 07/30/2015

# Trane US, Inc.

# NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

# D. QUALITY ASSURANCE

1. By Miami-Dade County Department of Regulatory and Economic Resources.

# E. MATERIAL CERTIFICATIONS

1. None.

# F. STATEMENTS

1. FBC, 2010 conformance letter, dated May 29, 2013, signed and sealed by Scott Wolters, P.E., on May 29, 2013.

# 3. NEW EVIDENCE SUBMITTED

# A. DRAWINGS

1. Drawing No. S6538-0029, titled "Trane Custom Climate Changer Air Handler Units", sheets 1 through 13 of 13, prepared by Wolters Engineering, Inc., dated October 30, 2015, signed and sealed by Scott Wolters, P.E., on October 30, 2015.

# B. TESTS:

1. None.

### C. CALCULATIONS:

1. None.

# D. QUALITY ASSURANCE

1. By Miami-Dade County Department of Regulatory and Economic Resources.

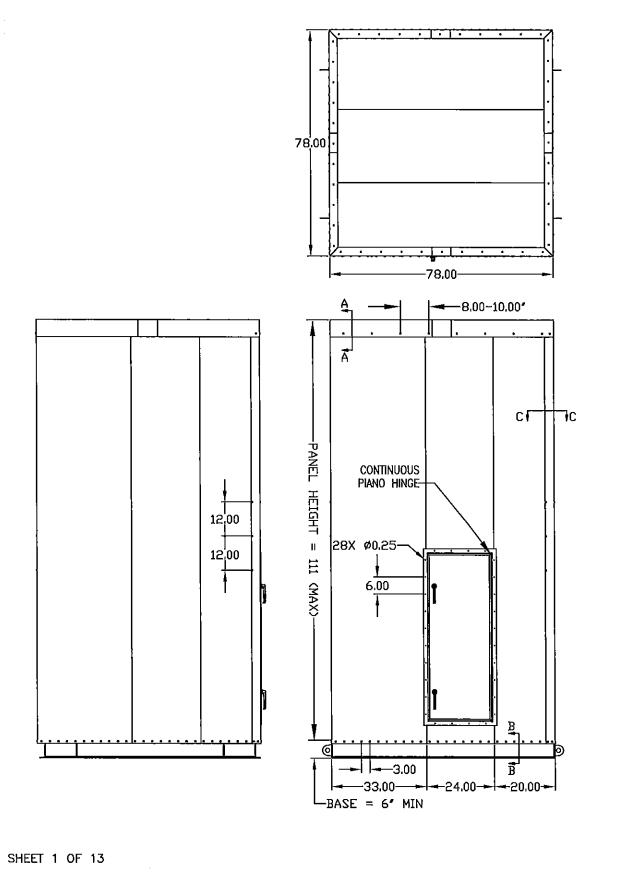
# E. MATERIAL CERTIFICATIONS

None.

### F. STATEMENTS

1. FBC, 2014 conformance letter, dated April 20, 2015, signed and sealed by Scott Wolters, P.E., on June 10, 2015.

Expiration Date: 08/28/2018 Approval Date: 07/30/2015



APPROVED MAX, SIZE FOR WALL PANELS At design wind load of 100 PSF for foam and 65 PSF for fiberglass

Wall 1,2,3 and 4 Foam (2" Thick) Fiberglass and Foam 33" x 111" (4" Thick) 24" x 111" 30" x 121" 20" x 111"

#### **FASTENERS**

Panels secured to the Base Structural Steel Frame with 1/4" Hex Head, Zinc Plated, Fasteners and Neoprene Washers Self-Tapping 3.0" O.C.(MAX)

#### UNIT BASE

Fully Welded 0.123"(min.) Thick Structural U Beam with intermediate U Beam Cross Supports at 24" O.C. (See notes Sht. 5)

#### UNIT FLOORS

Inner walk on Floor is 14 ga Steel

# ACCESS DOOR (60H x 24W AND 48H x 30W)

20ga G-90 Galv. (Outer) 20ga G-90 Galv. (Inner) ITM 4 Doors 2 Door handles- VENTLOK 260

# Wall Construction Detail (wall 1 and wall 3)

Inner Skin 20 ga steel/Outer Skin18 ga steel Internal Stiffener Layout

33" wide panel contains 3 internal stiffeners 24" wide panel contains 2 internal stiffeners 18" wide panel contains 2 internal stiffeners External Hat channels

Applied to door/opening seams only (wall 1) No Hat channels for wall 3

#### WALL CONSTRUCTION DETAIL (4)

Inner Skin 20 ga steel Outer Skin 18 ga steel 1 Stiffener per panel (Internal) Hat Channels at external wall panel seams Panel Widths: 33", 24" and 18"

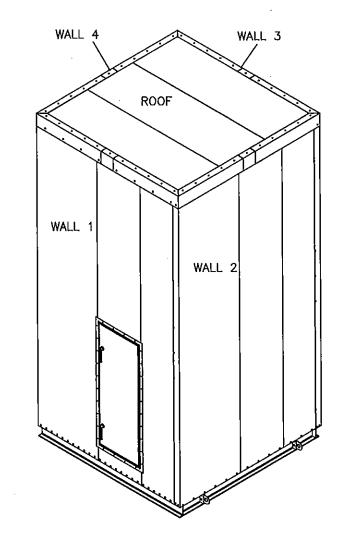
# WALL CONSTRUCTION DETAIL (2)

Inner Skin 0.050" AL Material Outer Skin 0.050" AL Material 1 Stiffeners per panel (Internal) Hat Channels at external wall panel seams Panel Widths: 33", 24" and 18"

#### ROOF CONSTRUCTION DETAIL

Inner AND Outer Skin 0.050" AL Material 1 Stiffener per panel (Internal) No Hat Channel Up To 77"L X 25"W, The Rest Follow Wall Panel Construction.

APPROVED MAX. SIZE FOR ROOF PANELS At aesign wind load of 75 PSF for foam and 48.75 PSF for flberglass (see Roof Construction details below)



UNIT CAN BE CONSTRUCTED WITH ANY ONE OF THESE WALL CONSTRUCTION METHODS OR ANY COMBINATION OF THESE CONSTRUCTION METHODS. SEE ALLOWABLE DESIGN WIND LOAD FOR FOAM AND FIBERGLASS. WHEN COMBINED THE ALLOWABLE DESIGN WIND LOAD SHALL BE LIMTED TO FIBERGLASS AS DESIGN LOAD (65 PSF FOR WALL AND 48.75 PSF FOR ROOF)

OPENING AND DIMENSIONS MAY VARY FROM CONTRACT DOCUMENTS / RETURN OF APPROVED DRAWINGS CONSTITUTES ACCEPTANCE OF THESE VARIANCES

NGINEER

WOLTERS ENGINEERING, INC. (CDAB 27194) 15211 97TH ROAD N

OCT 3 0 2014

SALES OFFICE:

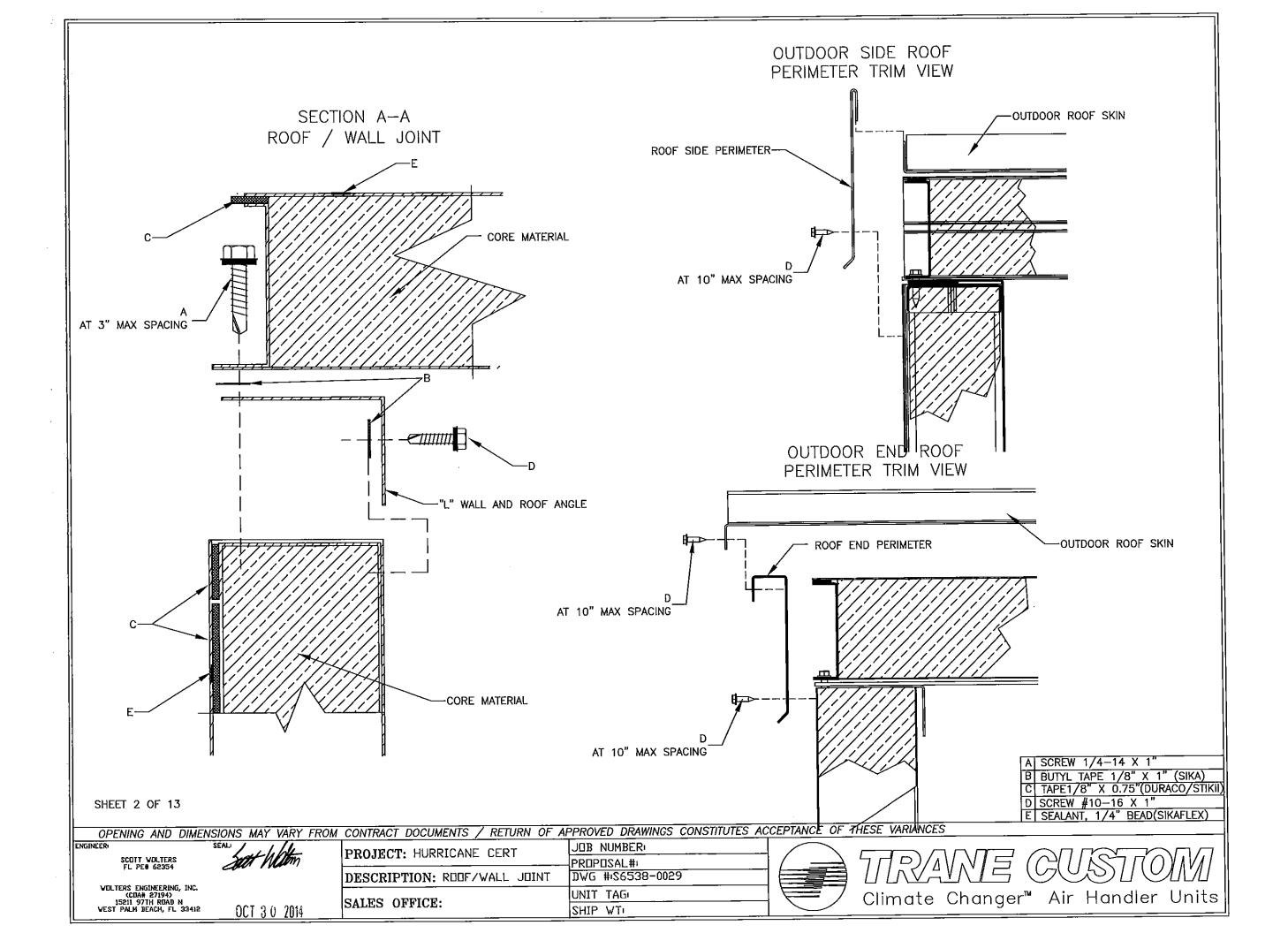
PROJECT: HURRICANE CERT

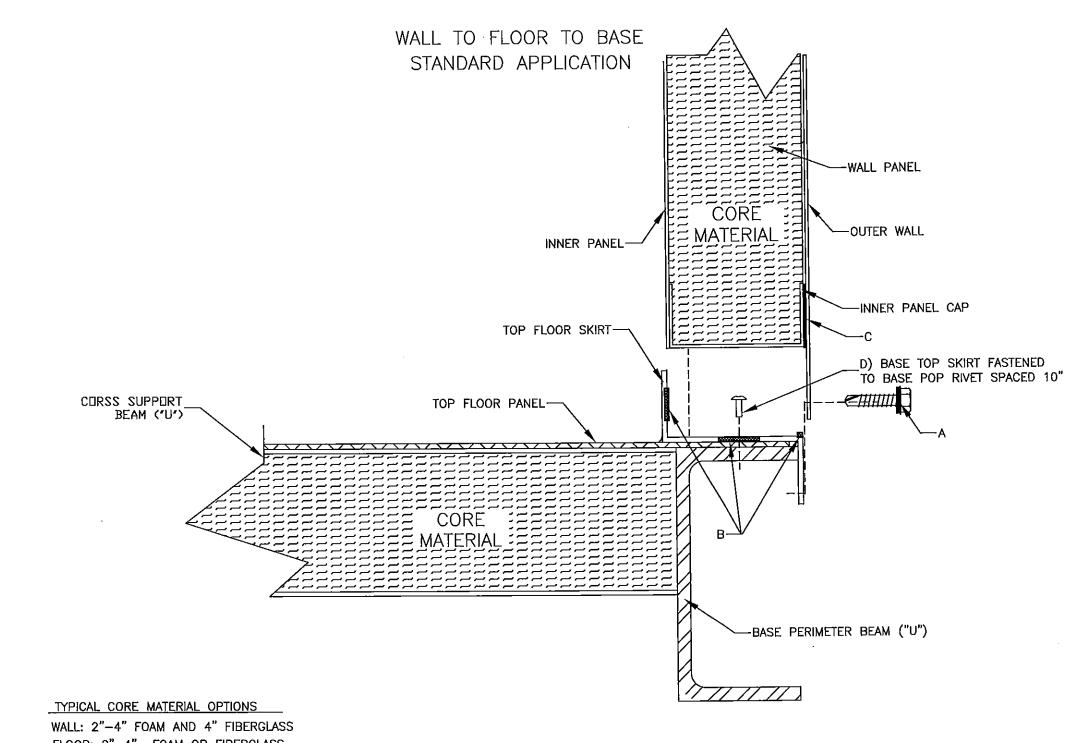
JOB NUMBER: PROPOSAL#i DESCRIPTION: TEST UNIT SPECIFICATION DWG #: S6538-0029

UNIT TAG TW 91H2



Climate Changer™ Air Handler Units





FLOOR: 2"-4" FOAM OR FIBERGLASS

SHEET 3 OF 13

SECTION B-B

A SCREW 1/4-14 X 1"

B SEALANT, 1/4" BEAD(SIKAFLEX)

C TAPE1/8" X 0.75"(DURACO/STIKII)

D RIVET, 5/16 X 1'

OPENING AND DIMENSIONS MAY VARY FROM CONTRACT DOCUMENTS / RETURN OF APPROVED DRAWINGS CONSTITUTES ACCEPTANCE OF THESE VARIANCES JOB NUMBER

SCOTT VOLTERS FL PE# 62354

WOLTERS ENGINEERING, INC. (CDAW 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412

OCT 3 0 2014

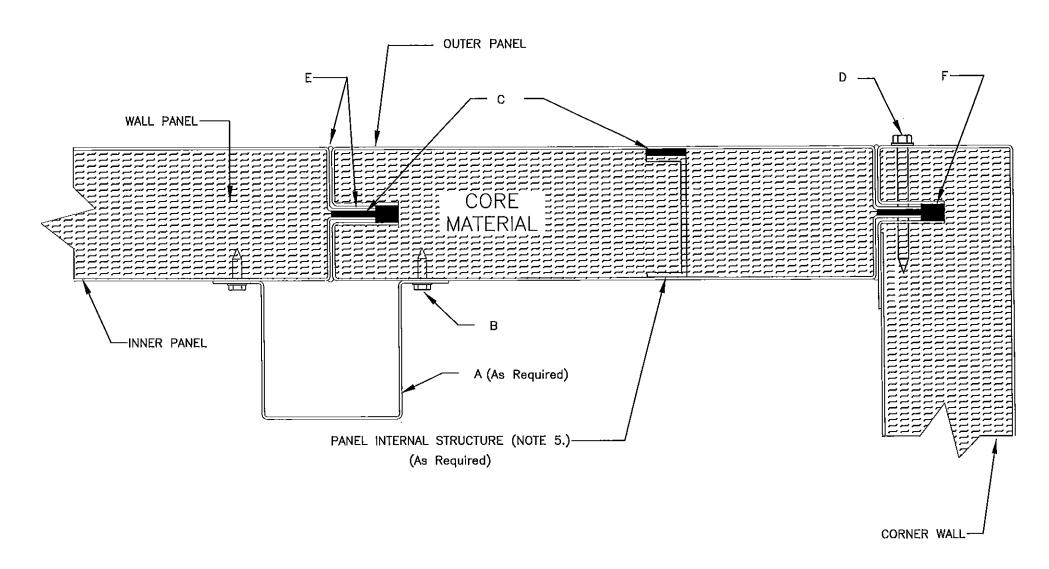
PROJECT: HURICANE CERT

PROPOSAL# DESCRIPTION: DWG #: S6538-0029 UNIT TAG SALES OFFICE: TW PIHZ



Climate Changer™ Air Handler Units

# TYPICAL WALL CASING DETAIL SECTION C-C



#### NOTES:

- 1. DOUBLE WALL THICKNESS CAN BE FROM 2 TO 4 INCHES, FOR FOAM CORE MATERIAL AND 4" FOR FIBERGLASS.
- 2. FOR MAXIMUM ROOF/FLOOR & WALL PANEL SIZES AND DETAILS, (SEE SHT. 1).
- 3. MAXIMUM WIND LOAD FOR FOAM WALL AND FLOOR PANEL DESIGN IS 100 PSF.
- 4. MAXIMUM WIND LOAD FOR FOAM ROOF PANEL DESIGN IS 75 PSF.
- 5. MAXIMUM WIND LOAD FOR FIBERGLASS WALL AND FLOOR PANEL IS 65 PSF.
- 6. MAXIMUM WIND LOAD FOR FIBERGLASS ROOF PANEL DESIGN IS 48.75 PSF.
- 7. PANEL INTERNAL STRUCTURAL "C" CHANNELS ARE SPOT WELDED TO INSIDE SKIN.

SHEET 4 OF 13

A HAT CHANNEL

B SCREW #10-16 X 1"

C TAPE1/8" X 0.75"(DURACO/STIKII)

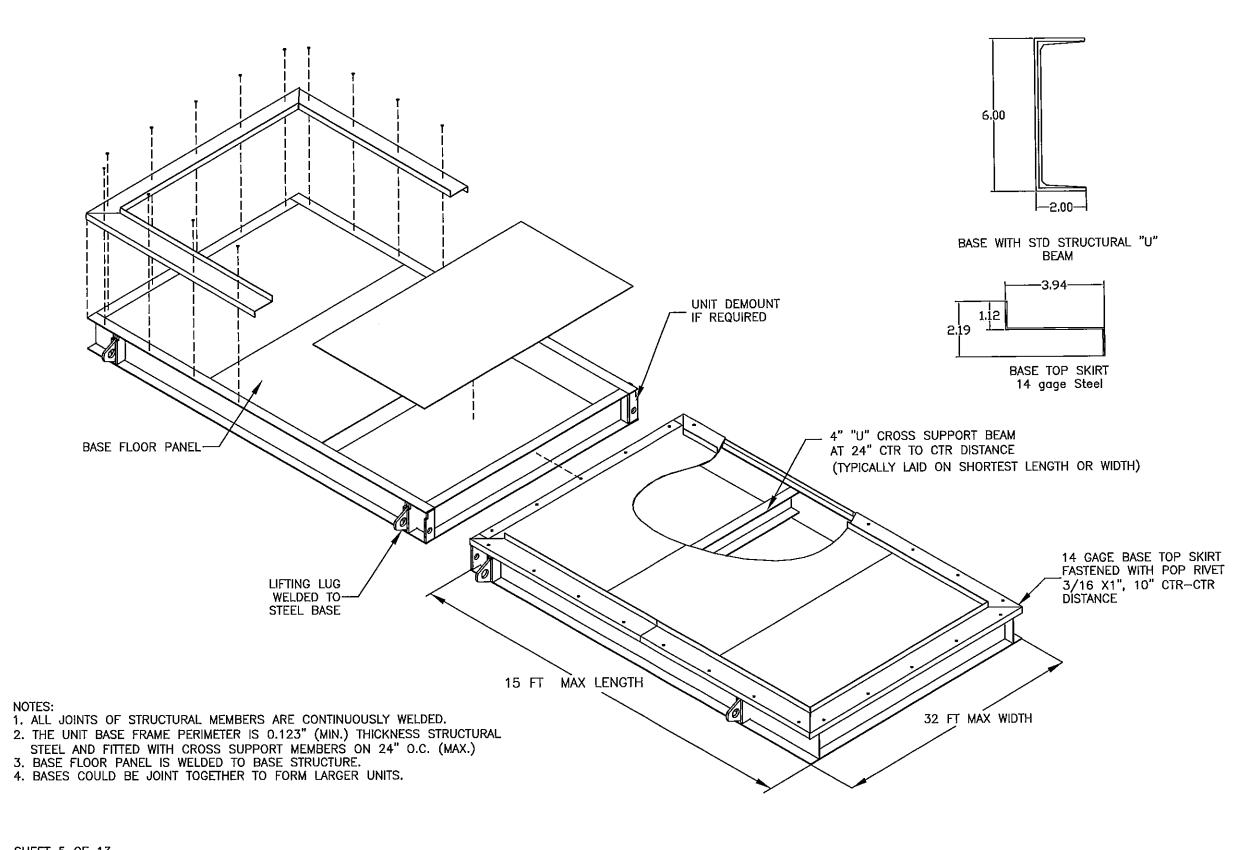
D SCREW #10-16 X 3"

E SEALANT, 1/4" BEAD(SIKAFLEX)

F TAPE 1/4" X 0.75"(DURACO/STIKII)

OPENING AND DIMENSIONS MAY VARY FROM CONTRACT DOCUMENTS / RETURN OF APPROVED DRAWINGS CONSTITUTES ACCEPTANCE OF THESE VARIANCES

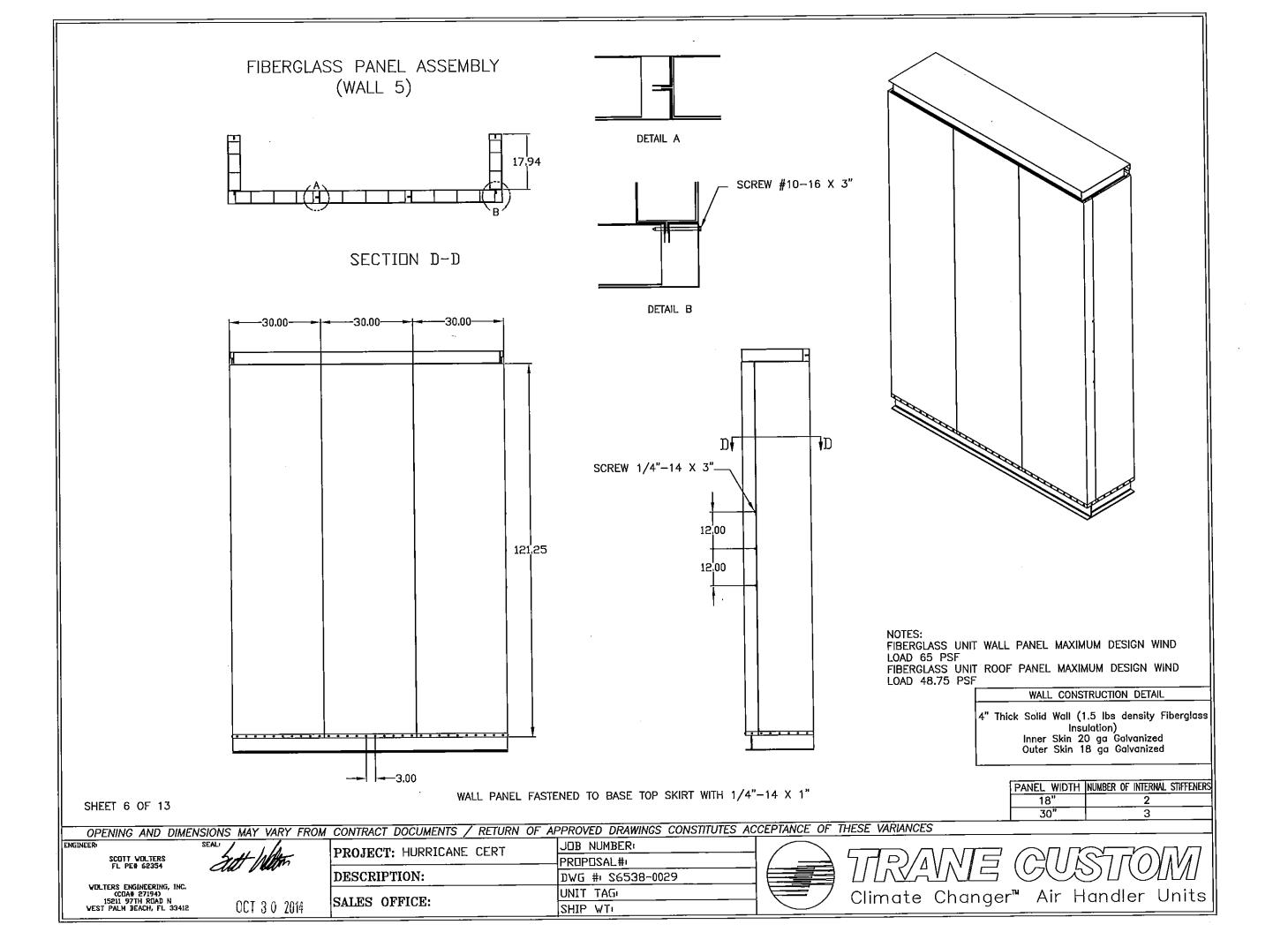
| SCOTT VOILTERS ENGINEERING, INC. (CDAN 27194) | OCT 3 0 2014 | SALES OFFICE: | SALES OFFIC

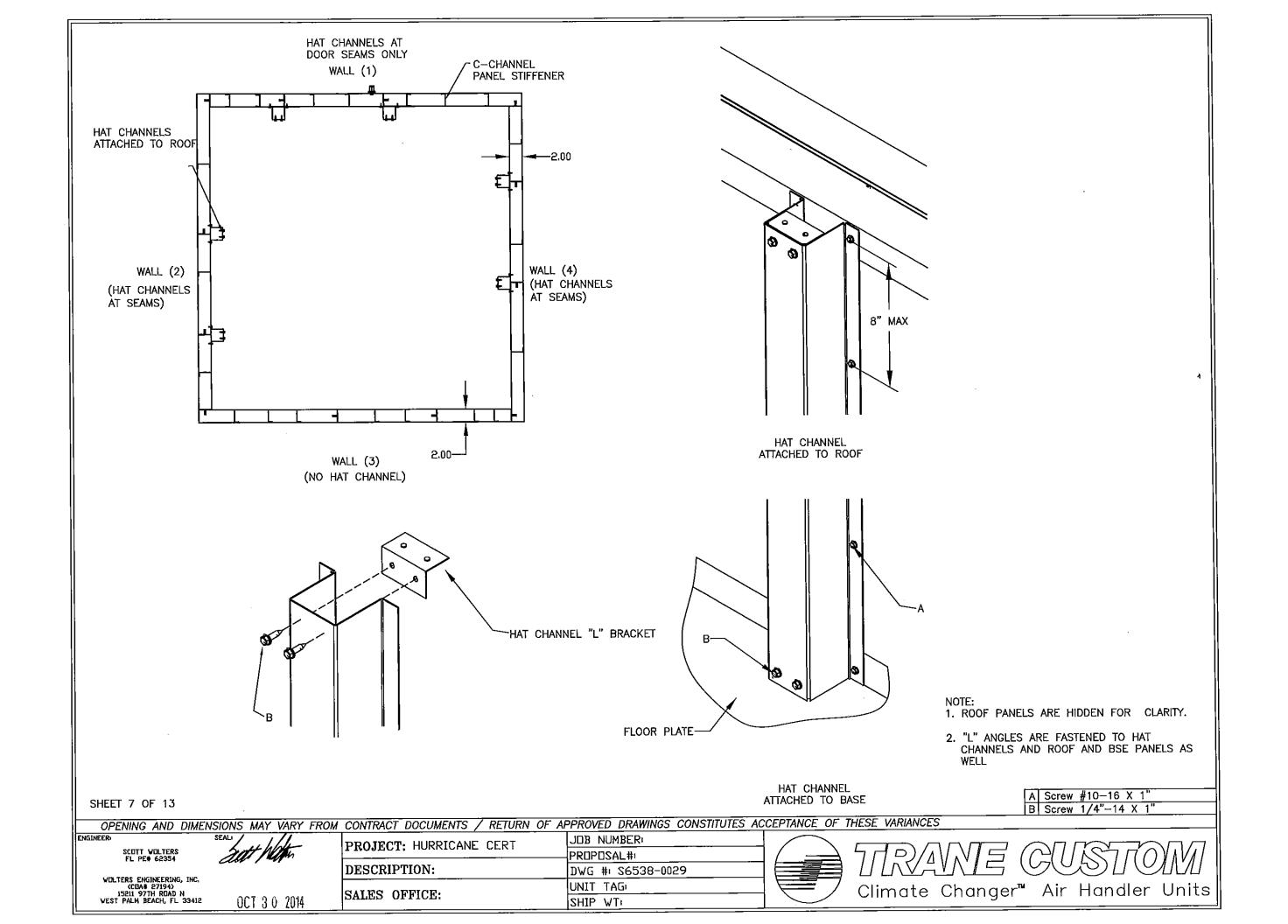


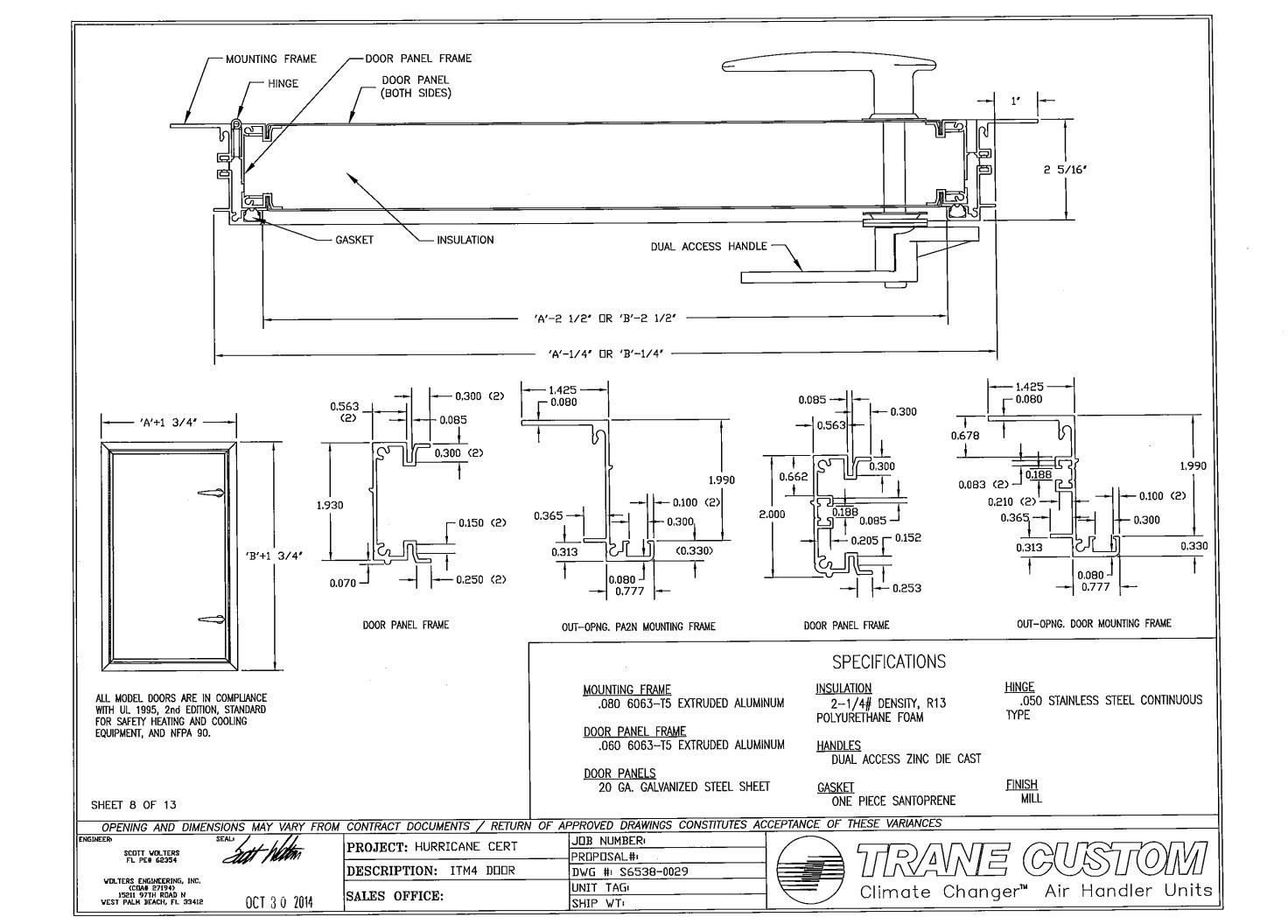
SHEET 5 OF 13

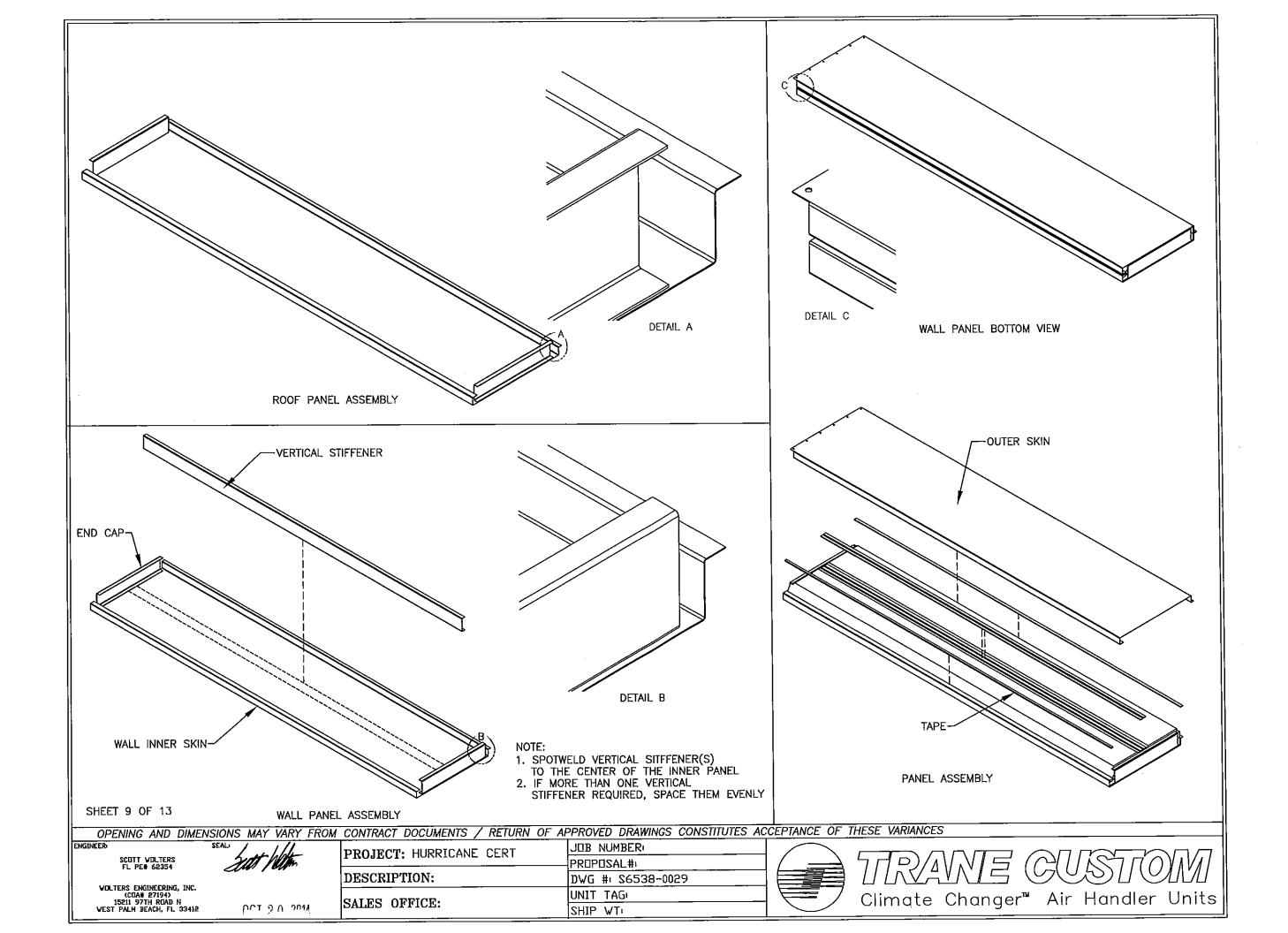
OPENING AND DIMENSIONS MAY VARY FROM CONTRACT DOCUMENTS / RETURN OF APPROVED DRAWINGS CONSTITUTES ACCEPTANCE OF THESE VARIANCES

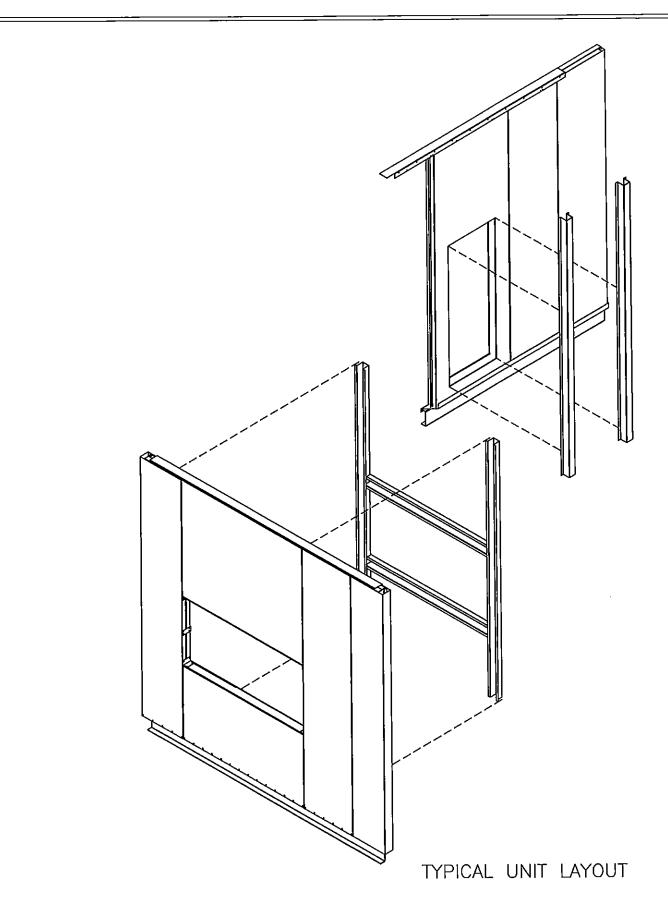
| SCOTT VOLTERS ENGINEERING, INC. (COAB 27/94) | DESCRIPTION: | DWG #1 S6538-0029 |
| VOLTERS ENGINEERING, INC. (COAB 27/94) | OCT 3 0 2014 | SALES OFFICE: | SALES OFFICE: | SALES OFFICE: | SALES OFFICE: | SHIP WT1

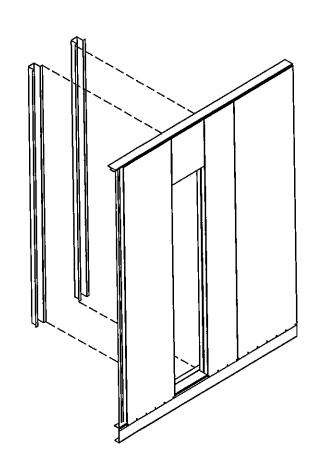












#### NOTES

- 1. OPENINGS WIDER THAN 24" WILL BE FRAMED AROUND
- 2. ONENINGS UP TO 24" WIDE GET VERTICAL HAT CHANNELS AT BOTH ENDS OF THE OPENINGS.
- 3. DOOR FRAME, REMOVEABLE PANELS, DAMPERS AND OTHER COMPONENT WILL BE FASTENED TO THE OPENINGS USING 1/4-14-1" SCREWS AT 10" MAX SPACING.

SHEET 10 OF 13

OPENING AND DIMENSIONS MAY VARY FROM CONTRACT DOCUMENTS / RETURN OF APPROVED DRAWINGS CONSTITUTES ACCEPTANCE OF THESE VARIANCES

SCOTT VOLTERS FL PE# 62354

> WOLTERS ENGINEERING, INC. (COAM 27194) 15211 97TH ROAD N VEST PALM BEACH, FL 33412

OCT 3 0 2014

PROJECT: HURRICANE CERT

DESCRIPTION:

SALES OFFICE:

DIB NUMBER

PROPOSAL#

DWG #: \$6538-0029

UNIT TAG:
SHIP WT:



Climate Changer Air Handler Units

